27 DEC 1951

LLWCHWR
Urban District Council

Annual Report
FOR THE YEAR
1950

BY

G. E. DONOVAN
M.D., M.Sc., D.P.H.

Medical Officer of Health

LLWCHWR
Urban District Council

Annual Report
FOR THE YEAR
1950

BY

G. E. DONOVAN

M.D., M.Sc., D.P.H.

Medical Officer of Health

Llwchwr Urban District Council.

Chairman : Councillor T. I. DAVIES, J.P.

Vice-Chairman : Councillor Mrs. H. OWEN, J.P.

Councillors :

EDWARD MORRIS.
G. THOMAS.
T. S. EDWARDS.
D. M. JENKINS
G. MATHIAS.
H. G. WILLIAMS
W. HILL.
E. I. BATTLE.
W. J. OWEN.
C. H. JONES.
J. R. JOHN.

WYNDHAM JONES.
E. G. THOMAS.
C. B. JONES.
D. T. REES.
J. GRIFFITHS
J. D. MORGAN.
Mrs. C. J. REES, J.P.
S. MEREDITH.
B. C. WILLIAMS.
G. WILLIAMS.
J. JONES

Public Health Committee :

Chairman : Councillor Mrs. H. OWEN, J.P.

Vice-Chairman : Councillor Mrs. C. J. REES, J.P

Chairman and 19 members of the Council

Public Health Officers.

Medical Officer of Health :

G. E. DONOVAN, M.D., M.Sc., D.P.H.

Sanitary Inspectors :

Senior Inspector—B. D. OWENS, C.R.S.I., Meat Cert., R.S.I.,
(M.S.I.A.)

Additional Inspector—M. C. DAVIES, C.R.S.I., Meat Cert., R.S.I.,
Dipl., R.I.P.H.H., (M.S.I.A., M.R.S.I., M.R.I.P.H.H.)

Clerk :

C. A. POWELL.

Llwchwr Urban District Council.

Public Health Department,
Council Offices,
Gorseinon.

To the Chairman and Members of the

LLWCHWR URBAN DISTRICT COUNCIL

Ladies and Gentlemen,

I present my Annual Report for the year 1950, which is the eleventh of its series.

John Ruskin has wisely stated, " There is no wealth but life." Machines, factories, land wealth, etc., is a mere nothing without life. Life does not mean mere existence but people with sound minds and sound bodies who are able to use and develop these resources so as to have fuller and more significant lives.

We live on this island under highly artificial conditions and the present situation is unique. A population of 50,000,000, people live in a tightly packed island ; such a condition has never occurred before. If we are to survive as a community, preventive medicine must be developed, and not, allowed to suffer from what Professor Picken calls " the creeping paralysis " of public health.

An editorial in the Medical Officer, dated 15th September, 1951 states : " It is clear the old era of public health is rapidly passing into oblivion. No ! not into oblivion, but into history, from which, eventually, it *may* be rebuilt. For the tradition still lives, though there are very few entering the service to revive it."

It appeared from the annual returns for examinations presented to the General Medical Council, that seven Universities as well as the Scottish and Irish Conjoint Boards had held no examinations for the D.P.H. in 1950. The Public health service was becoming less and less attractive, and the National Health Service Act, had worsened the position. Candidates were unwilling to come forward for the D.P.H. because they did not think it worth their while to become Medical Officers of Health.

The course of study to qualify in medicine is now so long and arduous, and the age of qualification so late, that very few can afford to have the enthusiasm to embark on a public health career. There is also the fact that curative medicine is much more dramatic, and has a greater appeal to the average doctor. If a doctor, despite the facts mentioned above, decides to go in for public health, he must be prepared to suffer financial loss and to accept a lower standard of living compared with his fellow colleagues. It is useless for them to enter public health except they are prepared to equip themselves for this career by spending time and money, plus loss of earnings, in doing their diploma in public health. Events have proved that very few are prepared to make this sacrifice. Public health is dying, and it may be that its traditions and technique may not be passed on to the younger practitioners in public health, as it is impossible to pass on this tradition and training to people who are not there.

Many of the ablest and best in preventive medicine have left, others, are leaving, and still more will leave in the future. A Medical Officer of Health is not only a specialist in public health, but qualified in other branches, such as curative medicine. Public health, up to the recent past, attracted the cream of the profession. Many of these Medical Officers of Health had higher degrees, such as the M.D., as well as their specialist diploma of D.P.H. They came to public health with years of hospital experience, and general practice behind them, They were able to increase the sum total of medical knowledge by research. The position today has greatly worsened.

Public health came into being not by accident, it was realised by the devastating effects caused by disease. Few people nowadays think of what these effects were. The Black Death reached Britain during the Summer of 1349. Within sixteen months the population of England was reduced by between one third and one half. The disease originated in China and spread right across Asia and reached Britain through Europe. The death rate for the whole world at that time was colossal.The effects on customs and institutions were very great it meant the collapse of the until then stable mediaeval system in Britain. I only mention the foregoing to show what happens to a country when it is up against a problem like this and has not adequate preventive measures to deal with it.

The pandemic of influenza in 1918 killed more than any visitation of disease in human history.

The influenza epidemic, which was of very considerable proportions in other parts of the country, reached this area by the last week in December, 1950 The death rate for the month of December was 14.4. per thousand of the population, which was much higher than 7.9 for the corresponding period in 1949. The affects of the influenza continued and is shown by 30.8 per thousand of the population during the month of January, 1951, which was higher than 10.3 in the corresponding period of 1950. The toll of deaths still continued as shown by a death rate of 14.4 per thousand during the month of February, 1951, which was higher than 10.3 for the corresponding period of 1950. The peak period was the third week in January, 1951, and then continued to wane until by the first week of February the epidemic had subsided very considerably.

Adults were more affected than children, especially elderly people. This, in my opinion, is attributed to the fact that adults tend to give priority to the children and put them to bed, whilst they remain on their feet. A contributing factor to the severity of disease in the over sixties would be the natural reluctance of these people to make themselves a burden by going to bed, and some of them would be suffering from chronic illnesses. Normally, without an influenza epidemic about 68 persons should have died ; but the number that died during this period was 138. The average age of the people who died was 71 years. It is interesting to note that only one child aged 11 months died of influenza, of the remaining deaths due to influenza the ages ranged from 59-91.

The epidemic caused much inconvenience to industry generally and the absenteeism was very high. Schools were affected and attendances were severely interfered with.

At the present time, research work is being carried on in various laboratories throughout the world on biological warfare. If war occurs, the public health services will be one of the first lines of defence. It is stated in the Memorandum on the Duties of Local Authorities in relation to (1) the Casualty Services and (2) Public Health in time of War as follows :

"It is possible that there might be a need for special vigilance against subversive attempts to cause disease or increase the prevalence of illness in the community. If any such attempts were made the public health service, assisted by the public health laboratory service, would be the first line of defence. If a threat of war should develop, local authorities may rely on their medical officers of health receiving confidential instructions and guidance from the Ministry of Health in the light of circumstances and medical knowledge at the time."

If an enemy can disrupt our public health service—which he will always try to do—he could get all the help from diseases naturally without the trouble of biological warfare.

Preventive medicine is good economics and a very cheap form of insurance. The cost of the curative medical service is approaching £500,000,000 a year, of which, only 7% is allotted to prevention. The wisdom of a people is enshrined in their old sayings, such as " Prevention is better than cure." and " Closing the stable door after the horse has been stolen." In the years before 1941 the deaths from diphtheria numbered about 2,500 a year and the cases 45,000. Deaths now number 200 in a year and the cases 4,000. The saving of hospital beds amounts to about 5,000, and, assuming the low cost of £14 per patient a week and an average duration of stay of seven weeks, the annual saving is nearly £4,000,000. The cost of immunisation is proportionately almost negligible. No case of diphtheria has occurred in our area during the year 1950, which is due to public health measures. The foregoing is only one of many example;

The first class midwifery domiciliary service built up by the leading health authorities rest on a sound tradition and recognise the home as the right place for a baby to be born into. If housing is the nation's first priority, it is reasonable to expect good homes to be used for the birth of babies, and the nursing care of many of the sick. The cost of a hospital bed for midwifery cases is approximately £36, whereas the cost of a domiciliary confinement is £13.

It is painfully evident that many new diseases or new plagues are on the increase. The incidence of gastric and duodenal ulcers and intestinal complaints, the alarming and steady increase in food poisoning, in exophthalmic goitre, in diabetes and rheumatism, is spectacularly high. The stress diseases such as high blood pressure, coronory thrombosis, cerebral haemorrhage, etc. which were rare half a century ago, are now very common. Many of these new diseases do not kill; indeed the majority of people do not die from the diseases from which they suffer; for example, a person who has suffered from rheumatism all his life may well die of cancer, heart disease, tuberculosis or from a road accident. The non-killing diseases, however, such as rheumatism and gastritis cause an immense amount of sickness and incapacity.

Tuberculosis can never be wiped out by curative medicine. It can be wiped out by preventive medicine. A very good example is the Llwchwr District. The notifications of non pulmonary tuberculosis were at the rate of 0.50 per thousand of the population in 1938; 0.27 per thousand of the population in 1940; 0.19 in 1950. Comparable figures for the whole of Glamorgan are: 0.48 in 1938; 0.46 in 1940; 0.27 for 1950. It should be noted that ours is 0.19 compared with 0.27 for the County.

The notifications for pulmonary tuberculosis for the Llwchwr District in 1938 was 1.43; in 1940 0.66; in 1950 0.78 per thousand of the population. It should be noted that the fall in the notifications of tuberculosis became very marked with the appointment of a whole time Medical Officer of Health for the area, and occurred well before 1948. Comparable figures for the County as a whole are: 1.19 in 1938; 1.36 in 1940; and 1.25 in 1950 per thousand of the population.

7,503 cases of food poisoning were notified in England and Wales during the year 1950, but not a single case was notified in the Llwchwr area. This shows the good work done by the Public Health Department.

The cost of retirement pensions to the country in 1948 was £238,000,000; by 1978 it will be at least £501,000,000. If in 1947 the proportion per thousand of the total population aged 65 and over was 104, by 1987 the proportion will lie somewhere between 154 and 181. It can be realised that it will be necessary from an economic point of view that a fair proportion of these must be producers and this is impossible except preventive medicine vigorously expands.

An increasing problem for the public health department is the care of the aged. The natural place for the aged is in their homes provided conditions are suitable. There is great difficulty in getting old people into Institutions whose conditions require that they should go to such places. The local authority have certain powers for the removal of these people, but, in practice, it is very hard to apply them, due to scarcity of beds in the Institutions. The Regional Hospital Board will only admit cases who are suffering from an illness and the Welfare Services of the County those who are not ill. Most of these old people who require removal are cases whose defects are due to senility. They are border-line cases and each side have a good excuse for refusing them admission. In fairness, I must state that the Master of Bryntirion, Llanelly, has always endeavoured to be most helpful.

The infant mortality rate for this area in the year 1949 was 20 per thousand live births, but in 1950 it was 33.06 per thousand live births. It will be noted that the position has worsened in this respect, but even so it is better than the infant mortality rate for 1950 in Glamorgan which is 39 per thousand live births.

The situation in relation to whooping cough has interesting possibilities. Trials in America and Britain are showing that a significantly low occurrence of illness is found in the vaccinated against whooping cough as compared with the controls in the ratio of 1 : 4.6 on an average who as a result of intra-familial or other fairly intense exposure contracted the disease, a lessened severity and shorter duration were remarked. Vaccination against whooping cough entails certain risks when there is a high incidence of poliomyelitis in an area. There is a quaint belief that some of the new anti biotic drugs would obviate the need for preventive measures. This is foolish, for often whooping cough might not be diagnosed before much harm had already been done to the patient. Prevention is more effe tive and cheaper to the community from every point of view. The Medical Research Council is carrying out trails on vaccination against Whooping cough and it is hoped that within two years an effective vaccine will be available.

The Medical Officer of Health needs to be close to the ground, working among the community for whose health he is responsibible. He must be prepared to keep on studying for the rest of his professional life.

The amount of time which I am officially allowed to devote to the Llwchwr Council in my capacity as Medical Officer of Health is one and five elevenths (1 & 5/11ths) half day sessions per week. This is calculated on what is known as a sessional basis of so many elevenths the week being divided into eleven (11) half day sessions Saturday afternoon and Sunday being excluded; although if an epidemic or something which requires immediate attention, I would not be expected to refuse on the grounds that Saturday afternoon and Sunday are not included in the week of sessions. In fact, I think you would feel somewhat disappointed if not definitely aggrieved, if I took such a selfish attitude. Evidently, the amount and kind of work has been regarded as nominal. If this is so, why is the appointment of a Medical Officer of Health still a statutory obligation on a Sanitary Authority.

The following is a passage from Report of the Ministry of Health for the year ended 31st March, 1950. Part 11. On the State of the Public Health, being the Annual Report of the Chief Medical Officer for the year 1949, which deserves quotation :

" The appointment of district Medical Officers of Health to do part-time work for the County Council has much to recommend it. It enables them to keep touch with the population of their areas at all ages, and forms a valuable link with County Medical Officer. Where such joint appointments are made, it should not be forgotten that the primary responsibility of the District Medical Officer is to his local sanitary authority, because there is a statutory obligation on all those authorities to appoint Medical Officers of Health, whose duties to them are laid down by statute. Too much emphasis on county work might lead to delay and confusion in dealing with outbreaks of infectious disease."

The amount of time allocated for my services as District Medical Officer of Health is inadequate. It is advised that the minimum time for the duties of district Medical Officer of Health for the Llwchwr Urban District Council at the lowest should be four and a half (4½) sessions per week, but preferably higher.

Medical Officers of Health can truthfully say "give us the very little we need and we shall deliver to you abled-bodied rate and tax-payers who will repay you, albeit som what unwillingly, hundreds of times what you have spent on them. The treatment of diseases such as tuberculosis costs you little and repay you handsomely. The emphasis is on the former and not the latter. The reduction in infectious diseases, due mainly to prevention, enormously reduced the cost of isolation hospitals."

Public opinion has come to appreciate that it is not a question that we cannot afford public health progress, but that we cannot afford to do without it—so great is the cost of illhealth. It is increasingly recognised, that some, if not all, of the conditions of public health are purchasable. Since Disraeli's day the cost has not been regarded so much as an expense, but as an investment which will reap rich dividends of health for the future.

I wish to acknowledge the co-operation I have received from the Chairman of the Health Committee, the staff of my own department, the Heads of other departments of the Council, Dr. W. E. Thomas, County Medical Officer of Health, Dr. A. R. Culley, Chief Medical Officer of the Welsh Board of Health.

I am, Yours sincerely,

G. E. DONOVAN,
Medical Officer of Health.

SOCIAL CONDITIONS AND CHIEF INDUSTRIES.

This area comprises both urban and rural features. It has developed into an industrial area with a series of townships and villages, and practically all these habitations have most of the amenities of a large town, and are provided with a pure supply of water from the Swansea Corporation Reservoirs at Velindre and Cray, sewerage schemes, scavenging services, public light, gas service and parks. In the very rural parts of the district, water is principally obtained from wells and springs, and the sanitation is primitive, provision of pails, etc.

There are three cinemas in the area : two at Gorseinon, and one at Pontardulais. There are no public libraries, but libraries are provided at the various Welfare Institutes.

The chief industries in the district are Coal-Mining, Steel Smelting, Tinplating and Agriculture.

AREA AND POPULATION

The Llwchwr Urban District is divided into four Parishes, namely, Llandilo-Talybont, Longhor, Gowerton and Llangyfelach; the total acreage being 17,815 acres.

The acreage of each Parish is as follows :—

Llandilo-Talybont	....	....	7,556 acres.
Gowerton	....	....	2,538 acres.
Llangyfelach	....	....	6,474 acres.
Longhor	....	....	1,247 acres.
			17,815 acres.

The estimated resident population of the district for 1950 is given by the Registrar-General as 25,620, a decrease of 60 as compared with 1949.

The number of inhabited houses at the end of the year was 6,856, and the ratable value of the district was £97,245, which represents a sum of £360 as the yield of a penny rate.

BIRTHS

The number of live births registered for the district in 1950 was, 363, of whom 188 were male and 175 females, representing a birth rate of 14.17 per thousand of the population The rate recorded for England and Wales is 15.8 per thousand of the population. In 1949, the net total births amounted to 354, with a birth rate of 13.8 per thousand of the population ; thus this year there is an increase of 9 births or 0.37, more than the rate recorded for the preceding year.

One male and one female illegitimate children were registered a proportion of 5.5 per thousand registered live births. It will be noted that the rate is down as compared with 1949 when it was 22.6.

The stillbirths numbered 14, that is 10 males and 4 females, which is equivalent to a rate of 37.1 per thousand total (live and still) births, as compared to 24.7 for the year 1949.

DEATHS.

The net total deaths after allowing for inward and outward transfers amounted to 287, of which 165 were males and 122 females. This gives a death rate of 11.20 per thousand of the population as eompared with 271 deaths and a death rate of 10.6 per thousand of the population in 1949. The death rate for England and Wales in 1950 was 11.6 per thousand of the population.

There were 12 deaths under 1 year during the year, giving an Infantile Mortality rate of 33.06 per thousand live births. The Infantile Mortality rate for England and Wales is given as 29.8 per thousand live births.

The death rate amongst illegitimate children was 0.00 per thousand illegitimate live births, whilst the rate for legitimate children was 33.23 per thousand legitimate births.

There were four maternal deaths during the year, representing a rate of 10.6 per 1,000 births (live and still). The maternal rate for England and Wales was :—

(*a*) Abortion with sepsis, 0.09
(*b*) Other abortion 0.05.
(*c*) Complication of pregnancy and delivery 0.54.
(*d*) Sepsis of childbirth and puerperium 0.03.
(*e*) Other eomplications of the puerperium 0.15.

One death occurred from diarrhoea and enteritis, giving a rate of 0.03 per thousand of the population. The rate for England and Wales was 1.9 per thousand.

Six deaths were due to all forms of Pneumonia, 12 due to Bronchitis, and 2 due to other forms of Respiratory Diseases, which gives a total of 20 deaths from all forms of respiratory diseases apart from Tuberculosis. giving a death rate of 0.78 per thousand of the population.

Ten deaths were registered from Tuberculosis of the Respiratory System, (there were no deaths from other forms of Tuberculosis), which is equivalent to a rate of .39 per thousand of the population.

There were no deaths registered from Violence; suicidal deaths, two.

Cancer and other forms of malignant disease caused 47 deaths, which is equivalent to a rate of 1.8 per thousand of the population.

The rates of deaths from Infectious Diseases in 1950 are as follows: —

	Llwchwr. No. of Deaths	Llwchwr Rate per 1,000 population	England and Wales. Rate per 1,000 population.
Smallpox	0	0.00	0.00
Whooping Cough ...	2	0.07	0.01
Diphtheria	0	0.00	0.00
Acute Poliomyelitis and Polioencephalitis	0	0.00	0.02
Typhoid and Paratyphoid	0	0.00	0.00
Influenza	6	0.23	0.10
Tuberculosis	10	0.39	0.36
Pneumonia	6	0.23	0.46
Scarlet Fever	0	0.00	Not Available
Cerebro-Spinal Fever	0	0.00	
Measles	0	0.00	

INFECTIOUS DISEASES.

Diphtheria. There was no case of Diphtheria during the year. It may be stated that the increase of Diphtheria in this area is low due to the extensive Immunisation Campaign.

General Practitioners in the Administrative County who participate in the County Council's Scheme for Diphtheria Immunisation and Vaccination against Small-pox may obtain serum and vaccine free of cost from the Medical Research Laboratories at Cardiff and Carmarthen.

It cannot be too strongly stressed that Diphtheria Immunisation gives nearly 100 per cent. protection and that in my opinion a parent or guardian who knowingly deprives a child of this protection is guilty to say the least of gross negligence—and that is using a mild term. There is no reason why anyone in this area can state that they are unaware of the facilities available to them for immunisation.

Scarlet Fever.—97 cases of Scarlet Fever were notified to my department during the year, 91 of which were admitted to Garngoch Isolation Hospital, compared to 74 cases in 1949.

The removal of cases of Scarlet Fever to Isolation Hospital in this district, depends upon home conditions. If the home conditions are such that in the opinion of the medical officer of health it is safe to nurse the patient at home, this is done, but if the home conditions are unsuitable the patient is admitted to Garngoch Isolation Hospital.

An outbreak of Scarlet Fever occurred at Pontardulais, and I thought it advisable to swab the whole of the Infants Department from which the majority of the cases occurred. The result was interesting. The investigation revealed that 51 scholars were harbouring the haemolytic streptococci either in their throat or nose, or both.

All carriers were excluded from school, and the children having xxx and xx growths were removed either to Garngoch Isolation Hospital or Hill House Isolation Hospital, whilst the remainder having x growths were treated at their respective homes by the general practitioners. They were not allowed to return to school until three consecutive negative swab results were obtained.

Pneumonia and Influenzal Pneumonia.—3 cases of Pneumonia and Influenzal Pneumonia were notified during the year, giving a rate of 0.11 per thousand of the population. The rate recorded for England and Wales was 0.70 per thousand of the population.

Erysipelas.—8 cases of Erysipelas were notified, producing a rate of 0.31 per thousand of the population, the rate for England and Wales being 0.17. Six cases were notified in 1949, giving a rate of 0.23.

Puerperal Pyrexia—4 cases of Puerperal Pyrexia were notified. This gives a rate of 10.61 per thousand total (live and still) births, and the rate for England and Wales was 5.81 per thousand. Three cases were notified in 1949, giving a rate of 8.26 per thousand births (live and still).

Venereal Diseases.—Many cases are brought to the notice of the public health department. Those who are not attending for treatment are contacted and encouraged to attend a V.D. clinic. Contacts are also requested to attend a clinic.

Wasserman Blood Tests are being done as a routine in the Ante-Natal Clinics, and the samples of blood are sent to the Cardiff and County Public Health Laboratory.

The nearest clinics for this area are held at Swansea and Port Talbot, and the sessions are as follows :—

Swansea Clinic (Situate at Swansea General and Eye Hospital:

Males —Monday, 2 p.m.
Tuesday, 7.30 p.m.
Friday, 10.30 a.m.
Females—Thursday, 1 p.m.

Port Talbot Clinic (Situate on the right hand side of the road immediately opposite the exit from G.W.R. Station) :

Males —Monday, 2.30 p.m. to 4.30 p.m., and 5 p.m. to 8 p.m.

Thursday—10.30 a.m. to 1 p.m., and 2 p.m. to 4 p.m.

Females—Wednesday 10.30 a.m. to 1 p.m., and 2 p.m. to 4 p.m.

Thursday 5 p.m. to 7 p.m.

Poliomyelitis. Five cases of Poliomyelitis occurred during the year under review, four of which were Paralytic and one non- Paralytic. Appropriate action was taken in each case.

No cases were notified during 1949.

ANALYSIS OF NOTIFIABLE DISEASES (other than Tuberculosis) during the year 1950.

DISEASES.	NUMBER OF CASES.													Total number of cases admitted to Garngoch Isolation Hospital.	Total Deaths.
	At all Ages	AGE PERIODS.													
		Under 1 Year	1 to 2	2 to 3	3 to 4	4 to 5	5 to 10	10 to 15	15 to 20	20 to 35	35 to 45	45 to 65	65 and over		
Smallpox	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Scarlet Fever	97	—	1	7	7	12	41	21	2	6	—	—	—	91	—
Diphtheria	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Enteric Fever	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Puerperal Pyrexia	4	—	—	—	—	—	—	—	—	4	—	—	—	4	—
Pneumonia	3	—	—	—	—	—	2	—	—	—	—	1	—	—	—
Erysipelas	8	—	—	—	—	—	—	—	—	—	2	2	4	4	—
Whooping Cough	3	2	—	—	—	1	—	—	—	—	—	—	—	—	2
Measles	87	5	7	26	15	21	11	1	—	—	1	—	—	2	—
Ophthalmia Neonatorum	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Poliomyelitis	5	—	1	—	1	1	—	2	—	—	—	—	—	5	—

TUBERCULOSIS.

20 Cases of Pulmonary Tuberculosis and 5 of other forms of Tuberculosis were notified during 1950. The total number of deaths registered from all forms of Tuberculosis was 10.

The cost of patching up a case of tuberculosis by the curative side of medicine may be as much as £1,000. The cost of prevention is almost negligible.

On receipt of a notification of surgical tuberculosis, the sanitary inspector automatically checks up on the milk supply from which district the notification is received.

To wipe out Tuberculosis from a community, it is necessary to have prompt diagnosis. This depends upon competent general practitioners, competent Tuberculosis Services with mass radiography, and sanatoria for the prompt isolation of suspected and early cases and the segregation of those who are suffering from the disease and liable to affect others.

Housing is very important for the prevention of Tuberculosis. The control and the advice given by the officers of the local authority helps dramatically in controlling the spread of this disease. Unfortunately there are many factors which militate against this.

A factor which tends to propagate Tuberculosis, especially among the young, is milk which contains the Tubercle Bacillus. Pasteurisation, T.T. Herds, etc., could render milk safe against Bovine T.B.

A lot of work has been done on artificially immunising young children against T.B. by means of B.C.G. Vaccine. This means that the child is given a very attenuated form of T,B, which is so weak that it does not cause the disease but gives the child immunity. Control experiments are being made in this country to test the practicability of those methods.,

Tuberculous Meningitis.—Streptomycin is a promising biotic agent for the treatment of T.B. Meningitis. The results so far are fair. Its real value is that it will eventually lead to the development of other agents which should be curative in the early stages.

Particulars of new cases of Tuberculosis and deaths from the disease are given in the following Table :—

NEW CASES AND MORTALITY DURING 1950

Age Periods	NEW CASES				DEATHS.			
	Respiratory.		Non-Respiratory.		Respiratory.		Non Respiratory.	
	M.	F.	M.	F.	M.	F.	M.	F.
0—	—	—	—	—	—	—	—	—
1—	—	1	1	—	—	—	—	—
5— ...	—	—	2	1	—	—	—	—
15—	1	4	1	—	—	—	—	—
25—	3	2	—	—	1	1	—	—
35—	3	—	—	—	2	—	—	—
45—	3	—	—	—	2	—	—	—
55— ...	2	—	—	—	2	—	—	—
65 and upwards	1	—	—	—	2	—	—	—
TOTALS..	13	7	4	1	9	1	—	—

PUBLIC HEALTH (PREVENTION OF TUBERCULOSIS) REGULATIONS, 1925.

No action was taken under this regulation during the year 1950, relating to Tubercular employees in the milk trade.

PUBLIC HEALTH ACT, 1936, SECTION 172.

No action was taken under this section during the year 1950,

Infantile Mortality Rate.—The Infant Mortality Rate is a very good index to the social circumstances of an area as the rate tends to be high in places where bad housing, overcrowding, defective sanitation, maternal ignorance and neglect, prevail. The rate for the Llwchwr area is 33.06 per thousand live births.

Tuberculosis Clinics. The curative treatment of Tuberculosis is in the care of the Regional Hospital Board, and patients suffering from this disease attend the Dispensary at 9/10 Grove Place, Swansea.

Hospitals.—The Gorseinon General and Maternity Hospital and Garngoch Isolation Hospital are under the control of the Glantawe Regional Hospital Board.

NATIONAL HEALTH SERVICE ACT, 1946.

Ambulance Facilities:

Infectious and Non- Infectious Cases. Since the 5th July, 1948, the Glamorgan County Council have taken over the control of the ambulance services in the administrative county.

As regards this area, an Ambulance Station has been established at Pontardawe, which controls the ambulances and cars stationed at Reynoldston Gowerton, Gorseinon, Pontardulais, Gwauncaegurwen, Cwmllynfell, Ystalyfera, Pontardawe and Clydach.

Laboratory Facilities. — Pathological and bacteriological specimens are submitted to the Cardiff and County Laboratory for examination.

NATIONAL ASSISTANCE ACT, 1948
Section 47.

During the year several cases were visited and relatives contacted and assurances given that care and attention would be given to the cases concerned. No legal action was taken.

WATER SUPPLIES.

The following Table show results of water samples taken during the year :—

WATER ANALYSIS—CHEMICAL AND BACTERIOLIGICAL REPORTS.

No.	Source	Chemical Report	Bacteriological Report
1.	Spring, Ffynon-Feibon, Llangyfelach	A faintly soft acid water. Chemical analysis shows no evidence of any recent organic contamination	Satisfactory. B. Coli absent from 100 m.l.
2.	Underground water from Garngoch Colliery No. 3, Penllergaer	An alkaline water of medium hardness. The chemical and Physical characters are unsatisfactory. The sample should be treated before being used as a boiler water.	Unsatisfactory
3.	Surface water from Culvert, Gellygynora Farm, Penllegaer	A fairly soft neutral water. The chemical and Physical characters are unsatisfactory.	Unsatisfactory
4.	Underground water, 6ft seam, Garngoch Colliery No. 3, Penllergaer	An alkaline water of medium hardness. Chemical analysis indicates the sample to be of fairly good organic quality, but physical characters are unsatisfactory.	Unsaticfactory
5.	Cray Resevoir, Townhill Supply	Chemical analysis indicates the sample to be of good organic quality.	Satisfactory.
6.	Underground water from 6 ft. seam, Garngoch Colliery No. 3, Penllergaer	A fairly soft neutral water containing a fair amount of dissolved iron. Chemical analysis indicates the sample to be of good organic quality but the physical characters are unsatisfactory. Iron 0.06.	Unsatisfactory
7.	Lake, The Mansion, Penllergaer	A fairly soft neutral water containing a small amount of dissolved iron. The chemical and physical characters are unsatisfactory.	Unfit for domestic purposes.

WATER ANALYSIS—CHEMICAL AND BACTERIOLOGICAL REPORTS (Continued)

No.	*Source.*	*Chemical Report.*	*Bacteriological Report.*
8.	Spring, Penwaunfach, Llangyfelach	A fairly soft acid water. Chemical analysis indicates the sample to be of doubtful organic purity.	Unfit for domestic purposes.
9.	Spring. Gwyl Angel, Loughor	A faintly acid water of medium hardness containing a considerable amount of dissolved iron ($^{1}{}_{12}$ grain per gallon), The chemical and physical characters are fairly satisfactory.	Satisfactory.
10.	Underground water, Colliery Drift. Pentrebach. Pontardulais. ..	A hard very acid water containing free mineral acid and iron in excessive amounts. The chemical and physical characters are unsatisfactory.	Satisfactory.
11.	Spring, Ffynon Feibion, Llangyfelach	A fairly soft acid water. Chemical analysis shows no evidence of any recent organic contamination.	Satisfactory.
12.	Spring, Cae Bassett, Gowerton	An acid water of medium hardness. Chemical analysis shows no evidence of any recent organic contamination.	Unsatisfactory.
13.	Rainwater collected from a Factory on Garngoch Common, Gorseinon ...	A fairly soft neutral water containing a fair amount of zinc. Chemical analysis indicates the sample to be of moderate quality for commercial purposes Zinc 0.60.	

I am indebted to Mr. Francis T. James, Engineer, for the following information regarding improvements of water supplies in the Llwchwr area :—

The Council have extended the 6 inch watermain in the main road from Frynllwchwr Road, Loughor, down to the Loughor Monument, as part of the major scheme for the improvement of water supplies in Loughor. In addition, a 4 inch watermain was laid across Hospital Road, Garngoch, to link up with the Penllergaer watermain, thus improving the supply to the Fur Factory of Swears and Wells, Ltd., and improving the somewhat awkward intermittent supply in the upper reaches of Penllergaer.

The old 4 inch steel tube watermain in Belgrave Road has been substituted by the 6 inch concrete lined cast iron watermain which has been productive of considerable increases in pressures in the Upper Loughor area, and the abandonment of the old main has prevented the considerable leakage and wastage of water which was previously prevalent

A scheme for the improvement of the pressures at the Gowerton Girls' Intermediate School, Cecil Road and Mount Pleasant, Gowerton, was commenced during the year and in fact has since been practically completed with the exception of a special connection under the Railway line, which, I am pleased to say, will be completed within a month from now. This scheme will, I have every hope, satisfactorily remedy the intermittent supplies which have been the subject of complaint at Mount Pleasant.

FOOD.

Man requires an adequate balanced diet. It is easy to calculate the number of calories, proteins, fats, carbohydrates, vitamins, etc, needed. At the present time, there is a great dispute between different medical authorities on the adequacy of our present diet. Unfortunately, the provision of diet depends on economics. There is also ignorance on the part of the public and false dietetic habits. Rickets, bad teeth and many other diseases depend on diet. The provision by the Minister of Food of special facilities for expectant and nursing mothers and for children have done a great deal of good. Due to the developement of the canteen habit, there is a potential danger of outbreaks of food poisoning due to the fact that one individual who may be a carrier can contaminate the food of hundreds who take their meals in the canteen. This means that greater precautions must be taken than hitherto,

Meat and Other Foods.—Since the outbreak of the War, the slaughtering of cattle, sheep and pigs generally (except the slaughtering of cottager's pig), has been centralised at the Swansea Abattoir, and therefore the Department is not in a position to furnish information relating to inspection and condemnation of cattle, etc., as required in paragraph 8 of Circular 2/50 (Wales).

Condemnation of Food. The following foods were condemned by the Sanitary Inspector during the year :—

48½ lbs.—Butter.
148½ lbs.—Ham and Bacon.
5 lbs.—Sausages.
238¼ lbs.—Tinned Meat.
987 lbs.—Raw Meat.
60 lbs.—Sultanas.
24 Packets—Cereals.
2 Jars—Meat Fish Paste.
3 Tins—Beetroot.
1 Pot Marmarlade.
7 Pots—Jam.
28¾ lbs.—Cheese.
110 Tins—Fruit.
140 Tins—Tomatoes.
68 Tins—Beans.
45 Tins—Fish.
82 Tins—Peas.
204 Tins—Milk.
157 Packets—Sponge and Scone Mixture.
140 lbs.—Dates.
5 lbs.—Sugar.
2¼ lbs.—Tea.
17 Tins—Soup.
10 lbs.—Macaroni.
88 Packets—Pudding Mixtures.

Food and Drugs.—Through the kindness of Dr. W. E. Thomas, County Medical Officer of Health, I am able to give the following particulars of samples taken and submitted to the Public Analyst :—

Milk	187	Condensed Milk	5
Vinegar	6	Tinned Jam	3
Dried Peas	4	Pickled Cabbage	1
Flour	1	Chocolate Spread	1
Macaroni	7	Mild Beer	1
Salt	4	Orangeade	1
Scone Flour Mixture	4	Vermicelli	2
Custard Powder	3	Pearl Barley	3
Pickled Onions	1	Olive Oil	1
Meat Paste	2	Glauber Salts	1
Pickle	1	Bicarbonate of Soda	2
Scone Pudding Mixture	1	Castor Oil	1
Baking Powder	6	Boracic Powder	2
Thyme	2	Tinned Soup	1
Brisling Paste	1	Golden Raising Flour	4
Drinking Chocolate	2	Tinned Tomatoes	1
Gravy Browning	3	Cake Flour Mixture	10
Rice	2	Tinned Beans	2
Margarine	1	Cooking Fat	1
Lard	2	Aspro	1
Pudding Mixture	6	Saccharine	1
Corn Flour	6	Borax	1
Sponge Mixture	8	Sultanas	1
Frizets	1	Tapioca	2
Bun and Cake Flour	1	Honey	1
Dessert Mould	6	Arrowroot	1
Semolina	4	Mincemeat	1
Ginger	2	Sardines	2
Epsom Salts	2	Salad Cream	1
Butter	2	Tinned Rhubarb	1
Tea	2	Mustard	2
Sauce	3	Mixed Spice	1
Cream Mould	1	Granulated Gelatine	1
Shredded Suet	1	Vegetable Salad	1
Lemon Curd	1	Sago	1
Blancmange	4	Jelly Crystals	1
Coffee	1	Sage	1
Split Peas	1	Kipper Snacks	1
Tinned Peas	1		
		Total	358

There were four samples of Scone Flour Mixture, three samples of Pudding Mixture and one sample of Dessert Mould found to be infested with meal mites.

There were two prosecutions for selling milk deficient in milk fat, one case was dismissed and the other offender fined £2 plus 28/- Analyst's fee.

Food Poisoning. There was no case of Food Poisoning notified during the year.

The total number of incidents (outbreaks and sporadic cases) reported in England and Wales was 3,979 an increase of 64% over the number reported in 1949.

The foods known or considered most likely to have originated the outbreak were noted in 435 outbreaks. In 268 of these outbreaks meat dishes were mentioned and in 78% of these incidents (48% of incidents in which the food responsible was known) the outbreak was associated with processed or made-up meat such as pies, stews, sausage meat, brawn pressed beef, reheated meat, rissoles, and cold meats.

MILK

Milk is a most nutritious food, but is is also a very dangerous food. It could spread diseases like Tuberculosis, Typhoid, Germs like Brucella Abortus which causes contagious abortion in cattle, and in human beings a chronic illness which shows symptons somewhat allied to Rheumatoid Arthritis.

Milk should come from healthy cattle, and be collected and distributed under the most hygienic conditions. Due to human fraility and error, it also is advisable that it should be pasteurised. This does not mean that one is advocating that the milk can be prepared under any conditions. It means that we should strive for the cleanest possible milk, and then, as a further precaution, pasteurise it. In an area like ours, I strongly advise that all milk should be heat treated before giving it to the young. The only effect of pasteurisation is to slightly change its taste, which the normal person will not notice. It cuts down the Vitamin C content and probably slightly affects the Calcium level. The slight loss of Vitamin C can be made up with Orange Juice, and the individual will get plenty of Calcium in his other foods.

During the year, 26 samples of milk produced in this area were submitted for the Tuberculosis test, the results of which were as follows :—

Negative	26
Positive	Nil

More sampling of milk for the presence of Tubercle Bacilli could be carried out but at present the number of samples which can be forwarded to the laboratory are limited by the County Council.

Bacteriological samples of milk were taken on 26 occasions and found to be :—

Satisfactory	26
Unsatisfactory	Nil

ICE-CREAM

It is a fairly common belief that freezing kills bacteria. Actually it is a good method of preserving their life for long periods.

It can be seen that there is a great danger if Ice-cream is made from materials which contain pathogenic organisms. What is even more dangerous is the actual introduction of organisms by insanitary methods of handling.

There have been numerous outbreaks of intestinal infection throughout the country due to Ice-cream, and consequently regulations have been in existence for some years requiring the registration of premises used for the preparation of Ice-cream. These premises are periodically inspected. Laboratory tests for cleanliness are desirable, but unfortunately, there is no known test which is sufficiently reliable for use as a statutory test of its contamination with non-pathogenic organisms.

At the present time, a good idea of the hygienic quality of Ice-cream can be got by doing a total bacterial count, coliform count, and the identification of the coliforms if of excremental type or otherwise.

It is very desirable that Ice-cream should be heat treated before being frozen.

Samples are taken by the Sanitary Inspector and submitted to the County Laboratory for examination. Unsatisfactory results are followed up in each case,

HOUSING.

During 1950, the following new Council houses were tenanted:

12 three bedroomed houses at Brynawel, Gorseinon.

30 three bedroomed houses at Ffosyrefail, Pontardulais.

making a total new construction since the end of the war of 224 houses.

The Council had under construction at the end of 1950, 120 Cornish Unit houses and flats at Penyrheol, 18 Cornish Units and flats at Loughor, and 12 Cornish Units and flats at Gowerton, while a further 46 traditional type houses and flats should be started early in 1951 at Penyrheol.

The completion of these houses and flats will naturally make a very large contribution to the relief of families in apartments who need houses, and especially permit the selection of certain families with one child who have formerly had to be left without consideration while larger families were being dealt with.

River Lliw. Flooding continues to take place by the above river overflowing its bank during continual rain, especially the area comprising Railway Terrace (22 houses), the main road between the L.M. & S. Station and the Lliw Bridge, Bryn Terrace Eynon Street, Chapel Street and Gwalia Terrace, Gorseinon.

The Council have rehoused the families from those houses most persistently affected.

Rodent Control. The Prevention of Damage by Pests Act, 1949, came into operation on the 31st March, 1950, on which date the Rats and Mice (Destruction) Act, 1919 was repealed. The powers and duties of local authorities in relation to control of rats and mice are to be found particularly in Part 1; and certain enabling provisions are contained in Part 3. The new Act greatly strengthens the powers of the authorities and furnishes them with the means of achieving radical improvement in the control of rats and mice.

The important difference between the provisions of the new and old Acts is that Borough and District Councils are now directly vested whereas formerly the vesting was in the County Councils, with the right of delegation to Borough and District Councils willing to accept the duties.

The new Act emphasis the primary obligation as being upon the local authority to ensure that, so far as is practicable, its area is kept free from rats and mice. Under the old Act the primary duty was laid upon the individual occupier, coupled with a right to the local authority to enforce the requirements upon him.

The Act requires the submission of reports as required. It is requested that the first report should be for the period ending 31st December 1950 (nine months), and thereafter reports should be rendered annually. Form PDP/R being the first report has been completed and returned to the Ministry of Agriculture and Fisheries (Infestation Control Division). It is necessary to make this return before the Council is eligible for 50% grant which is subject to government audit.

As mentioned in previous reports this Council has employed a full-time Rodent Operator since 1946.

Systematic visits are made to dwelling houses, business premises, refuse dumps etc. from time to time, and where infestations are found the Council invariably carry out the work and recover the cost by so doing from business people; treatment is free in the case of private houses.

The following is a resume of the work done during the year under review :—

Number of Reservoir Infestations Treated	Nil	369
Number of Major Infestations Treated	14	
Number of Minor Infestations Treated	355	

Number of Dwelling houses Treated	339	369
Number of Local Authority Properties Treated	1	
Number of Business Premises Treated	29	

Casual labour is employed for sewer treatments, and the maintenances treatments were done during the year.

Co-operation has always existed between the Ministry of Agriculture and Fisheries and this Council with regard to rodent control, and whenever considered necessary, simultaneous treatment has been effected.

Removal of Refuse and Nightsoil.—During the year the work of collection of house refuse and nightsoil and emptying of cesspools was undertaken for the first time by direct labour and no private contracts now exist for this work.

Three refuse lorries and a combined cesspool emptier and nightsoil collector were purchased and a new garage erected at Brighton Road, Gorseinon.

Practically the whole of the Llwchwr area now have a twice weekly collection of house refuse and about 130 houses are visited for removal of nightsoil once weekly. In addition, 90 cesspools in the area are now emptied as required.

There are still about 40 houses within 100 feet of the Council's sewers that could be connected thereto and relieve the necessity of making collections of pails contents.

FACTORIES ACT, 1937.

As required by Section 128(3) of the Factories Act, 1937, I give below particulars with respect to matters under Part 1 and Part 8 of the Act as administered by this Council :—

(1)	Factories in which Sections 1, 2, 3, 4, and 6 are to be enforced by Local Autharites Number on Register	26
	Inspections -ditto	29
	Number of Notices served	Nil
	Prosecutions	Nil

(2)	Factories not included in (1) in which Section 7 is enforced by the Local Authority — Number on Register	77
	Inspections —ditto	80
	Number of notices served	2
	Prosecutions	Nil

(3)	Cases in which defects were found :—	
	Dangerous and Dilapidated Buildings (Sect.58 P.H.A. 1936)	1
	Sanitary Conveniences :—	
	Undesirable or defective	1
	Total	2
	Remedied	2
	Prosecutions	Nil
(4)	Outwork (Sections 110 and 111)	Nil

General.—The sooner the Public Health Department has a disinfecting station, adequate staff and office accommodation the better it will be from the view of public health.

APPENDIX.

1.—General Statistics.

Area of District—17,815 acres.
Number of inhabited houses at the end of the year—6,856.
Rateable Value of District—£97,245.
Sum represented at 1d. rate—£360.
Registrar-General's estimate of resident population, mid-1950—25,620.

2—Extracts from Vital Statistics of the Year.

	Total	M.	F.	
Live Births:—				
Legitimate	361	187	174	Birth rate per 1,000 of the estimated resident population—
Illegitimate	2	1	1	14.17
Still Births:				
Legitimate	13	10	3	Rate per 1,000 total (live and still births)
Illegitimate	1		1	37.1
Deaths	287	165	122	Death rate per 1,000 of the estimated resident population — 11.20

		Rate per 1,000 total (live & still)
Total Deaths from Pregnancy childbirth abortion	4	10.6

Death rate of Infants under 1 year of age:—
All Infants per 1,000 live births—33.06.
Legitimate Infants per 1,000 legitimate live births—33.23.
Illegitimate Infants per 1000, illegitimate live births—0.00

Deaths from Cancer (all ages)—47.
Deaths from Measles (all ages)—0
Deaths from Whooping Cough (all ages)—2.
Death from Diarrhoea (under 2 years of age)—1